## Official



Application No.: 09/449,215

## Amendments to the Claims:



The following is a listing of the present claims in the application. No claims are currently amended.

1. (Previously Amended) An image management system comprising:
a picture and archival and communication system (PACS) server having a
plurality of inputs and outputs, the inputs configured to receive image information signals
and the outputs configured to provide image output signals, the PACS server configured
to store information representative of a plurality of two dimensional image slices, and the
output signals representative of the stored two dimensional image slices;

an imaging device having an output coupled to at least one of the inputs of the PACS server, and configured to provide an image signal; and

a PACS workstation having an input coupled to at least one of the outputs of the PACS server, and configured to receive output signals from the PACS server representative of selected two dimensional image slices stored by the PACS server, the PACS workstation configured to construct three dimensional image renderings from the two dimensional image slices and the PACS workstation having an output coupled to the PACS server and configured to provide the PACS server with a signal representative of the three dimensional rendering.

- 2. (Previously Amended) The image management system of claim 1 wherein the three dimensional rendering signal may be stored by the PACS server as a three dimensional rendering file.
- 3. (Previously Amended) The image management system of claim 2 wherein the three dimensional rendering file may be selectively communicated to a PACS workstation.
  - 4. Cancelled.
  - 5. Cancelled.

- 6. The image management system of claim 1 wherein the imaging device is a medical imaging device.
- 7. (Previously Amended) The image management system of claim 2 wherein the PACS server includes a three dimensional rendering file storage.
- 8. (Previously Amended) The image management system of claim 1 wherein the PACS workstation is configured to provide a three dimensional rendering by multiplane reconstruction (MPR).
- 9. (Previously Amended) The image management system of claim 1 wherein the PACS workstation is configured to provide a three dimensional rendering by multiplane volume reconstruction (MPVR).
- 10. (Previously Amended) The image management system of claim 1 wherein the PACS workstation is configured to provide a three dimensional rendering by maximum intensity pixel (MIP) projection.
- 11. (Previously Amended) The image management system of claim 1 wherein the PACS workstation is configured to provide a three dimensional rendering by volume rendering.
- 12. (Previously Amended) The image management system of claim 1 wherein the PACS workstation is configured to provide a three dimensional rendering by surface rendering.
- 13. (Previously Amended) The image management system of claim 2 wherein the three dimensional rendering file includes the parameters needed to reconstruct the three dimensional image rendering.

14. (Previously Amended) A method of producing a rendering of a three dimensional object from a plurality of two dimensional image information files, comprising: receiving, by a picture archival and communication systems (PACS) server, a plurality of two dimensional image information files from an imaging device;

storing the plurality of two dimensional image information files on the PACS server;

communicating selected two dimensional image information files to the PACS workstation;

receiving the selected two dimensional image information files by the PACS workstation;

constructing a three dimensional image information file based on the selected two dimensional image information files; and communicating the three dimensional image information file to the PACS

server.

- 15. Cancelled.
- 16. Cancelled.
- 17. (Previously Amended) The method of claim 14 further comprising: receiving a plurality of two dimensional image slices by the PACS workstation.
- 18. The method of claim 14 wherein the imaging device is a medical imaging device.
- 19. The method of claim 14 wherein the communicating step is carried out over an ethernet connection.
  - 20. (Previously Amended) The method of claim 14 further comprising: storing the three dimensional image file by the PACS server.

- 21. (Previously Amended) The method of claim 20 further comprising: communicating the three dimensional image file stored by the PACS server to the PACS workstation.
- 22. The method of claim 14 wherein the three dimensional image information file includes the parameters needed to reconstruct the three dimensional image rendering.
  - 23. (Previously Amended) A medical imaging system, comprising:
    - a medical scanner;
- a picture archival and communication system (PACS) server coupled to the medical scanner and configured to receive and store signals representative of two dimensional image slices from the medical scanner;
- a PACS workstation configured to receive selected signals representative of two dimensional image slices and configured to construct a three dimensional rendering file from the signals representative of the two dimensional image slices,

wherein the three dimensional rendering file is communicated to and stored by the PACS server.

- 24. Cancelled.
- 25. Cancelled.
- 26. The medical imaging system of claim 23 wherein the medical scanner is an ultrasound imaging device.
- 27. The medical imaging system of claim 23 wherein the medical scanner is a magnetic resonance imaging (MRI) device.
- 28. The medical imaging system of claim 23 wherein the medical scanner is a computed tomography (CT) imaging device.
- 29. (Previously Amended) The medical imaging system of claim 23 wherein the PACS workstation includes a display.

- 30. (Previously Amended) The medical imaging system of claim 29 wherein the PACS workstation is configured to provide a [partial] three dimensional rendering representative of the three dimensional rendering file on the display.
- 31. (Previously Amended) The medical imaging system of claim 23 wherein the three dimensional rendering file may be selectively communicated to the PACS workstation.
- 32. The medical imaging system of claim 23 wherein the three dimensional rendering file includes the parameters needed to reconstruct the three dimensional image rendering.